

REMARKS/ARGUMENTS

Reconsideration and allowance in view of the foregoing amendment and the following remarks are respectfully requested.

Claims 1, 3, 5-8 and 10-15 are now pending.

Formal drawings are submitted herewith.

Original claims 1-14 were rejected under 35 USC 112, first paragraph. Reconsideration and withdrawal in view of the amendments to the specification and claims presented herein above and the following explanation are respectfully requested.

Claim 7, 11 and 13 have been revised to make clear that the grooves direct the flow of the specified gas toward the second gas inlet hole of the inner cover.

As correctly noted by the Examiner, Figure 15 is not a cross-section of Figure 14, but rather a bottom view of Figure 14 and the brief description of Figure 15 has been corrected accordingly. Also, as recognized by the Examiner, the V-shaped groove 215 is formed in the outer cover 21, not inner cover 22, and projects inward. Page 21 has been corrected accordingly. No new matter has been added as the corrected description at Page 21 is fully consistent with the ninth embodiment as illustrated in Figures 14 and 15, which was understood by the Examiner.

As is clear from Figures 14 and 15 and the corrected description at page 21, the V-shaped groove 215 is formed so that the outer cover correspondingly projects inward. Thus, the V-shaped groove is formed in the outer wall but because of the limited thickness of the outer wall, the groove is like a pleat that projects inward into the clearance between the inner and outer covers. The protrusion of the grooves 215 into the clearance forms channels as illustrated in Figure 15 which will serve to guide and direct flow towards the wider clearance portion, and the second gas inlet hole(s) 220.

With regard to claims 5 and 6, an example of a gas flow-opposed or flow-intercepting wall is wall 224. Claim 5 has been amended to refer to gas flow-intercepting wall and to describe its disposition with respect to a flow direction of gas between the inlets.

With regard to the Examiner's questions regarding claim 14, the Examiner's attention is respectfully directed to Figure 14 which illustrates a groove 215 generally in alignment with labeled inlet 220.

With regard to the Examiner's question on the paragraph bridging pages 10 and 11, as illustrated, shoulder 211 tapers toward the bottom of the cover assembly. The specification has been revised for clarity in this regard.

With regard to the reference to tapered wall 222 extending inward and downward from a portion closer to the base of the cover assembly than shoulder 211, as illustrated in Figure 1, the base side is the upper side as illustrated in the drawings. Also note that at page 10, line 4, the flange of the cover assembly 2 is also referred to as "a base". As shown, the tapered wall 222 begins closer to the base side than the shoulder 211. It should be noted, however, that tapered wall 222 as illustrated in particular in Figure 1 also ends before shoulder 211 ends in the direction of the closed end of the cover assembly so that the taper 222 starts before shoulder 211 starts and taper 222 can end before shoulder 211 ends. Thus, the location of the base is clearly disclosed and would be understood in the context of pages 10 and 13, and the extent of taper 222 is clear.

With regard to the Examiner's objection to page 21, the noted phrase referred to inlet holes 220 as formed in tapered wall 222, not flange 29. This passage of the specification has been revised. Note also that it is the inlet holes 222 that are oriented downward by virtue of the tapered wall 222. Thus, it is the inlet holes that are formed and oriented downward and those inlet holes are formed in the tapered wall 222.

In view of the foregoing, reconsideration and withdrawal of the rejection of the claims under 35 USC 112, first paragraph is respectfully requested.

Claims 1-14 were rejected under 35 USC 112, second paragraph, as being indefinite. With regard to claims 1 and 8, the term "opposed" was used to refer to parts being in facing or adjacent relation, not at respectively opposite ends, as apparently understood by the Examiner. These claims have been revised to avoid the Examiner's misinterpretation. With regard to claims 5 and 6, these claims cover, e.g., intercepting wall 224 of the illustrated embodiment and have been revised to address the Examiner's confusion. With regard to claims 7, 11 and 13, the term "groove" is used consistent with the specification. It is noted that the groove formed in the outer surface of the outer cover defines a protrusion from the inner surface of the outer cover. The remaining claims have been revised as discussed above to address the Examiner's objections.

Claims 1, 2, 5 and 8 were rejected under 35 USC 102(e) as being anticipated by Makino et al (USP 6,346,179). Further, claims 3 and 4 were rejected under 35 USC 103(a) as unpatentable over Makino '179. Applicant respectfully traverses these rejections.

Anticipation under Section 102 of the Patent Act requires that a prior art reference disclose every claim element of the claimed invention. See, e.g., Orthokinetics, Inc. v. Safety Travel Chairs, Inc., 806 F.2d 1565, 1574 (Fed. Cir. 1986). While other references may be used to interpret an allegedly anticipating reference, anticipation must be found in a single reference. See, e.g., Studiengesellschaft Kohle, G.m.b.H. v. Dart Indus., Inc., 726 F.2d 724, 726-27 (Fed. Cir. 1984). The absence of any element of the claim from the cited reference negates anticipation. See, e.g., Structural Rubber Prods. Co. v. Park Rubber Co., 749 F.2d 707, 715 (Fed. Cir. 1984). Anticipation is not shown even if the differences between the claims and the prior art reference are insubstantial and the missing elements could be supplied by the

knowledge of one skilled in the art. See, e.g., Structural Rubber Prods., 749 F.2d at 716-17.

Claim 1 has been amended above to more specifically state the one of the outer and inner covers of the cover assembly has a shoulder which separates the clearance between the outer and inner covers into a wider and a narrower portion and wherein the wider portion is located nearer the second gas inlet hole of the inner cover than the narrow portion. In Makino, as noted by the Examiner, an inner cover part is provided that has a taper near its lower end in the orientation illustrated. The result of this tapered portion however is to create a clearance that is wider adjacent the first gas inlet holes 63 and narrower adjacent the second gas inlet holes 61 which is in contrast to the invention specifically claimed in claim 1. Inasmuch as Makino teaches a narrower portion near second holes 61, not the wider portion nearer those holes, it is respectfully submitted that claim 1 is not anticipated by Makino.

In order to prove obviousness, a challenger must present prior art references which disclose the claimed subject matter of the patent/application in question. If separate prior art references each disclose separate elements of a claim, the challenger must also show some teaching, suggestion, or incentive in the prior art that would have led one of ordinary skill in the art to make the claimed combination. See, e.g., Ashland Oil, Inc. v. Delta Resins & Refractories, Inc., 776 F.2d 281, 297 n.24, 304-05 (Fed. Cir. 1985), cert. denied, 475 U.S. 1017 (1986). In determining obviousness, there must be some reason other than hindsight for selectively combining the prior art references to render the claimed invention obvious. See, e.g., Interconnect Planning Corp. v. Feil, 774 F.2d 1132, 1143 (Fed. Cir. 1985).

The secondary references cited by the Examiner do not teach or suggest to the skilled artisan that Makino's cover assembly should be reconfigured so as to correspond to the configuration specifically claimed by applicant. The invention claimed is submitted, furthermore, to have significant advantages over Makino. In this regard, the

structure claimed has the advantage that the interference of a return gas flow produced within the clearance, oriented toward the first gas inlet hole, is minimized.

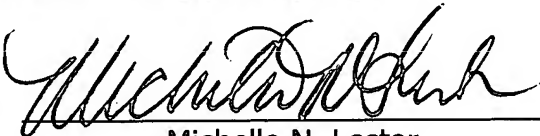
It is also respectfully submitted that Makino fails to teach or suggest the features of applicant's dependent claims. Note for example that claim 5 requires that the gas flow intercepting wall be disposed at an angle to the gas flow direction and that the second gas inlet hole be formed in the gas flow intercepting wall. The second gas inlet hole of Makino is formed in a wall that is generally parallel to the gas flow in the clearance and perpendicular to the direction of the gas flow into holes 61 and thus there is no teaching of a wall disposed at an angle to intercept the gas flow path as claimed in claim 5.

With regard to claim 7, it is noted that this claim is not rejected over the prior art nor are the remaining dependent claims of this application. Therefore all those claims are submitted to be patentable over Makino.

All objections and rejections having been addressed, it is respectfully submitted that the present application is in condition for allowance and an early Notice to that effect is earnestly solicited.

Respectfully submitted,

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